

PIVOTING TO PROTECT

By Matt Schnepf

As schools nationwide faced myriad challenges presented by COVID-19, Purdue University set a shining example of how to safely return to in-person instruction in the fall of 2020.

Efficient and accurate tests became a priority for screening anyone on campus experiencing COVID-19 symptoms plus individuals selected for random surveillance testing. Responding to the need, the [Animal Disease Diagnostic Laboratory](#) (ADDL) in the College of Veterinary Medicine gained Clinical Laboratory Improvement Amendments certification to test human samples of SARS-CoV-2. This gave Purdue the capacity to perform up to 2,000 COVID-19 polymerase chain reaction (PCR) tests per day. More than 213,000 PCR tests have been conducted by the lab.

“The ADDL is prepared for high-volume testing during disease outbreaks,” says Kenita Hendrix, ADDL director and clinical associate professor of veterinary diagnostic microbiology. “We have the trained staff, proper equipment, necessary laboratory workflow, and established testing protocols in place. A rapid diagnostic response is critical to the authorities for decision making in times of crises. Disease mitigation and control depends on these test results.”

The ADDL has performed COVID-19 testing on tens of thousands of samples in support of Protect Purdue protocols and Big Ten regulations—even providing quick test results for student-athletes prior to games. Without the ADDL’s fast and accurate testing, Purdue’s athletic events could not have taken place.

Recognizing the need for testing to protect the broader community, the ADDL extended its services to outside entities, including a local hospital and a small college. The lab’s expertise enabled its diagnosticians to not only detect COVID-19 but also differentiate between variants of the virus through sequencing, the results of which have been shared on state and national levels.

“When challenges like this arise, Purdue steps in,” says Willie Reed (PhD V’82), dean of the College of Veterinary Medicine and cochair of the Safe Campus Task Force. “The combination of scientific and engineering excellence makes us stand out from the crowd. We have STEM expertise, including a world-class veterinary medical school, biomedical researchers, and more.”